



## IMAGE FORMING APPARATUS

### FIELD OF THE INVENTION

5 The present invention relates to an image forming apparatus  
such as an electrophotographic printer, a facsimile machine and a  
copier, and specifically relates to a structure of a cleaning  
unit of such an image forming apparatus for scraping residual  
toner from a surface of a photoconductor after completion of an  
electrification process on the surface of the photoconductor and  
10 a toner transference process.

### BACKGROUND OF THE INVENTION

The invention overcomes problems as explained below.

### 15 CONVENTIONAL PARTS OF THE INVENTION

Fig. 9 is a schematic side view of an image forming  
apparatus 50 having a conventional cleaning unit. A  
photoconductive drum 51 serving as an image carrier is installed  
in a not-illustrated chassis as well as a not-illustrated driving  
unit that drives the photoconductive drum 51 to rotate in the  
direction of the arrow A. A charging roller 52 for charging the  
periphery 51a of the photoconductive drum 51, an LED head 53 for  
irradiating the charged periphery 51a with an image beam to form  
an electrostatic latent image, and a developing roller 55 for  
causing a toner 54 to adhere to the latent image are disposed  
25 around the photoconductive drum 51.

A developing unit 56 is comprised of the developing roller  
55, a toner supply roller 57 for supplying the developing roller  
55 with the toner 54, and a not-illustrated toner cartridge  
30 storing the toner 54 to be supplied to the toner supply roller 57  
and the developing roller 55. A transferring roller 58 and a  
cleaning unit 59 are disposed downstream from the developing  
roller 55. The transferring roller 58 receives at its rotation  
axis a certain pressure from a not-illustrated spring, so that

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